



UNITED STATES PATENT AND TRADEMARK OFFICE

UNITED STATES DEPARTMENT OF COMMERCE
United States Patent and Trademark Office
Address: COMMISSIONER FOR PATENTS
P.O. Box 1450
Alexandria, Virginia 22313-1450
www.uspto.gov

APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
09/713,479	11/15/2000	William Romine	QSOFT.050A	3574

20995 7590 07/26/2006

KNOBBE MARTENS OLSON & BEAR LLP
2040 MAIN STREET
FOURTEENTH FLOOR
IRVINE, CA 92614

EXAMINER

LE, DEBBIE M

ART UNIT	PAPER NUMBER
----------	--------------

2168

DATE MAILED: 07/26/2006

Please find below and/or attached an Office communication concerning this application or proceeding.



UNITED STATES PATENT AND TRADEMARK OFFICE

Commissioner for Patents
United States Patent and Trademark Office
P.O. Box 1450
Alexandria, VA 22313-1450
www.uspto.gov

MAILED

JUL 26 2006

Technology Center 2100

**BEFORE THE BOARD OF PATENT APPEALS
AND INTERFERENCES**

Application Number: 09/713,479
Filing Date: November 15, 2000
Appellant(s): ROMINE ET AL.

John R. King
For Appellant

EXAMINER'S ANSWER

This is in response to the appeal brief filed May 9, 2006 appealing from the Office action mailed December 19, 2005.

(1) Real Party in Interest

A statement identifying by name the real party in interest is contained in the brief.

(2) Related Appeals and Interferences

A statement identifying the related appeals and interferences which will directly affect or be directly affected by or have a bearing on the decision in the pending appeal is contained in the brief.

(3) Status of Claims

The statement of the status of claims contained in the brief is correct.

(4) Status of Amendments After Final

The appellant's statement of the status of amendments after final rejection contained in the brief is correct.

(5) Summary of Claimed Subject Matter

The summary of claimed subject matter contained in the brief is correct.

(6) Grounds of Rejection to be Reviewed on Appeal

The appellant's statement of the grounds of rejection to be reviewed on appeal is correct.

(7) Claims Appendix

The copy of the appealed claims contained in the Appendix to the brief is correct.

(8) Evidence Relied Upon

6,519,613	Friske	2-2003
6,499,033	Vagnozzi	12-2002

6,122,640

Pereira

9-2000

(9) Grounds of Rejection

The following ground(s) of rejection are applicable to the appealed claims:

Claims 1, 3-7, 9-11, 19-23, 30, 32-36, 40 and 49 are rejected under 35 U.S.C. 103(a) as being unpatentable over Friske in view of Vagnozzi.

Claims 2, 8, 21, 24, 25, 37, 38, 41 and 49 are rejected under 35 U.S.C. 103(a) as being unpatentable over Friske in view of Vagnozzi, and further in view of Pereira.

(10) Response to Argument

I.) The cited references disclose applying two partial locks during a reorganization process.

Appellant argues that references fail to teach applying a partial lock to an original table and partial lock to a reorganized table since Vagnozzi, allegedly, merely teaches a database is locked against updates during a retrieval operation, and that Vagnozzi, allegedly, does not teach applying partial locks to a database tables during reorganization. The examiner respectfully disagrees with appellant's arguments. Appellant's claim 1 calls for the step of "applying a first partial lock to the original table, the first partial lock blocking select data modification operation while allowing other operation against the original table" and "applying a second partial lock to the

reorganized table, the second partial lock blocking select data modification operation while allowing other operation against the original table". Pursuant to appellant's appeal brief (page 5, lines 10-12), to define said partial lock to block one of the select data modification operations (e.g., "insert", "update", or "delete" operations). Similarly, Vagnozzi discloses a system to lock out an update operation while allowing any number of other operations, such as retrieval operation, on the table to process concurrently (col. 15, lines 26-29). The step of claimed invention blocking select data modification operation while allowing other operation against the database table are hence very analogous to Vagnozzi's teaching while the database must be locked against update operation, but allowing any number of other retrieval operations on the table to process concurrently. Although Vagnozzi teaches "permits fields to be added to the database without having to reorganize the database" (col. 2, lines 63-64), but by the meant of adding new fields to the database, it would be equivalent to the "reorganization" of the database because the structured of database has been changed with newly added fields.

In the event that the honorable Board of Appeals finds that Vagnozzi inadequately discloses the claimed step of reorganized, the teachings of Friske should remedy such deficiency. Friske discloses an analogous system to Vagnozzi's system that the method to reorganize a database that does not prevent other processes from accessing the database while the reorganization is in progress (column 3, lines 5-7). Furthermore, Friske's invention discloses a lock is applied to an original table or on a source (col. 3, lines 6-8, et seq), and a reorganized table also lock is in place (abstract,

last 3 lines, et seq), and Vagnozzi is directed to a system for locking out one of selected data modification operation (e.g., an update operation) while allow any number of other operations (e.g., a retrieval operation). Because the two references are concerned with the solution to allow users continuing access to the database even a lock is applied to the database table. Consequently, it would have been obvious to one of ordinary skill in the art of data processing to modify Friske with Vagnozzi because it would allow users of Friske's system to reduce locking overhead and increase concurrency during database operations requiring access (e.g., query processing), as suggested by Vagnozzi (col. 15, lines 35-38).

II.) The cited references teach keeping a reorganized table accessible while substituting the reorganized table for an original table.

Appellant alleges that since Vagnozzi does not teach the reorganization, therefore, Vagnozzi does not teach keeping a reorganized table accessible while substituting the reorganized table for an original table. The examiner respectfully disagrees with appellant's allegations. Examiner relies on Friske for teaching the claimed limitation substituting the reorganized table for the original table (Fig. 4, element # 422). As discussed in the preceding above, although Vagnozzi teaches "permits fields to be added to the database without having to reorganize the database" (col. 2, lines 63-64), but by the meant of adding new fields to the database, it would be equivalent to the "reorganization" of the database because the structured of database has been changed

with newly added fields. Because the two references are concerned with the solution to the problem of applying lock to the database, but still allowing users to continuous access to the database. Alternatively, it would have been obvious to one of ordinary skill in the art at the time the invention was made to modify Friske's teaching by utilizing the lock out update operation against the database as taught by Vagnozzi to the reorganized table of Friske's system, but still allow users of Friske's system continuing access the reorganized table during the database substitution. Such, modification would improve Friske's system to reduce locking overhead and increase concurrency database requiring access operations.

III.) The Friske and Vagnozzi patents can be properly combined to yield the claimed invention since they are analogous art.

1.) Appellant argues that the combination of Friske and Vagnozzi is impermissible hindsight, and that said combination is not suggested by the references. In response to appellant's arguments that the examiner's conclusion of obviousness is based upon improper hindsight, appellant is reminded that any judgment on obviousness is in a sense necessarily a reconstruction based upon hindsight reasoning. But, so long as it takes into account only knowledge which was within the level of ordinary skill at the time the invention was made, and does not include knowledge gleaned only from the applicant's disclosure, such a reconstruction is proper. See *In re McLaughlin*, 443 F.2d 1392, 170 USPQ 209 (CCPA 1971). In this particular case, the

judgment on obviousness only takes into account an amount of knowledge, which was within the level of the ordinary skilled artisan at the time the invention was made. That is the claimed partial lock blocking select data modification operation while allowing other operation against the database table is analogous to Vagnozzi's teaching while the database must be locked against update operation (e.g., data modification), but allowing any number of other retrieval operations on the table to process concurrently. Consequently, the reconstruction of the claimed invention is properly derived from the combination of the references.

2.) In response to appellant arguments that there is no suggestion to combine the references, the examiner recognizes that obviousness can only be established by combining or modifying the teachings of the prior art to produce the claimed invention where there is some teaching, suggestion, or motivation to do so found either in the references themselves or in the knowledge generally available to one of ordinary skill in the art. See *In re Fine*, 837 F.2d 1701, 5 USPQ2d 1596 (Fed. Cir. 1988) and *In re Jones*, 958 F.2d 347, 21 USPQ2d 1941 (Fed. Cir. 1992). In this case, Firske is directed method for applying lock to database table while provide substantially continuous access to the database while the reorganization is in progress, and Vagnozzi is directed method for applying lock to a database, this lock is blocked against an update operation, but allowing any number of other retrieval operations on the table to process concurrently. Because the two references are concerned with the solution to the problem of applying lock to the database, but still allowing users to continuous access to

Art Unit: 2168

the database. Consequently, the ordinary skilled artisan, would have been motivated to combine the references since Vagnozzi's teaching would enable users of Friske's system to reduce locking overhead and increase concurrency during database operations requiring access, as suggested by Vagnozzi (col. 15, lines 35-38).

IV.) Pereira combination with Friske and Vagnozzi teach every element of claims 2, 8, 21, 25, 37, 41 and 49.

1.) Appellant alleges that Pereira reference does not teach applying a partial lock to a reorganized object during a reorganization process because Pereira patent's disclosed use of two locks on a single table does not allow for such continue access. As discussed in the preceding above, Friske and Vagnozzi are combined teaching the claimed limitation applying partial lock to reorganized table during a reorganized process. Accordingly, the combination of Friske, Vagnozzi and Pereira teaches every limitations of each rejected claim.

2.) Appellant alleges that Pereira does not teach keeping a reorganized table accessible while substituting the reorganized table for an original table. As discussed in the preceding above, Friske and Vagnozzi are combined teaching the claimed limitation the reorganized table remains continuously accessible during the database substitution. Thus, the combination of Friske, Vagnozzi and Pereira teaches every limitations of each rejected claim.

V.) Conclusion

The references disclose the claimed partial lock, blocking select data modification to the original table and reorganized table while allowing other operations against said original and said reorganized table. Further, Friske and Vagnozzi are combined to teaching the claimed limitation the reorganized table remains continuously accessible during the database substitution. Additionally, Friske and Vagnozzi can be properly combined to yield the claimed invention since they are analogous art. In light of the forgoing arguments, the examiner respectfully requests the honorable Board of Appeals and Interferences to sustain the rejection.

Respectfully submitted,

Debbie M. Le

Primary Examiner, AU 2168

July 19, 2006.

Conferees :

for
Jeffrey Gaffin (SPE)

Hosain Alam (SPE)



Application/Control Number: 09/713,479
Art Unit: 2168

Page 10